Environmental Justice Considerations involving Toll Roads

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Associated Guidance

- Executive Order 12898
- 1964 Civil Rights Act-Title VI
- Civil Rights Restoration Act of 1987
- FHWA Technical Advisory 6640.8A
- FHWA Technical Advisory 6640.23
- 23 USC 109 (h)
- CEQ guidance on Environmental Justice
- 23 CFR 450

Executive Order 12898 on Environmental Justice

Directs that programs, policies, and activities receiving federal funding not have a disproportionately high and adverse human health and environmental effect on minority and low-income populations.

1964 Civil Rights Act - Title VI

Assures that individuals are not excluded from participation in, denied the benefit of, or subjected to discrimination on the basis of Race, Color, National Origin, Age, Sex, Disability or Religion under any program or activity receiving Federal financial assistance

23 USC 109 (h) Community Impact Assessment

Requires consideration of anticipated effects of proposed transportation projects on residences, businesses, farms, accessibility of public facilities, tax base, and other community resources.

Fundamental Concepts of Environmental Justice

- 1. To avoid, minimize, or mitigate disproportionately high and adverse human health or environmental, social or economic effects on minority and low-income populations.
- 2. To ensure full and fair participation by all potentially affected communities in the transportation decision-making process.
- 3. To prevent the denial of, reduction in, or significant delay in the receipt of benefits by minority and low-income populations.

Analysis Methods for Toll Roads

System Level

Project Level

Local Toll Policies

System Level Analysis

- When an interconnected network of toll-roads are proposed, the EJ/Title VI impacts need to be analyzed not only for the individual toll facilities, but also cumulatively for the entire system
- Attempts to segment projects for purposes of analysis has been a major cause of delay even if the project is ultimately approved

What is an appropriate level of detail for the EJ analysis of a regional tolling program?

- State
- County
- Census Tract or Traffic Analysis Zone (TAZ)
- Census Block Group

What could be addressed in an EJ Disproportionate Effects Evaluation for a proposed regional toll program?

- Regional toll systems operation plan
- Direct effects of the tolling program on EJ population's use of the transportation system
- Other effects of the tolling program on EJ population
- Opportunities to mitigate adverse impacts
- Determination of disproportionate high and adverse human health and environmental effects on minority and/or low-income populations

Project Level Analysis Potential Issues

- Are non-toll facilities available?
- Do non-toll facilities result in an increase in travel time or distance for users?
- How will tolling affect transit?
- How much will the toll be?
- Will it be 100% Electronic tolling? If yes, what will be the financial burden of enrolling, in addition to the actual toll? (Credit card, minimum balance, automatic recharge, monthly service fee, etc)?
- What are the obstacles to users?
- Will it disproportionately burden a class of users?
- Will there be a no-pay or discount option for lowincome drivers?

Project Level Analysis Potential Issues

- What are the income levels of users?
- Diversion of traffic through neighborhoods?
- Increased air quality/noise issues in neighborhoods?
- Access to businesses ?
- Does tolling result in the denial of federal benefits to a protected class of users?
- What benefits result from the project?
- How are the benefits distributed?
- Are there adequate north/south and east/west corridors?

Local Toll Policies

The evaluation of potential EJ/Title VI impacts of a toll system or individual projects should also include the toll policies for that particular system.

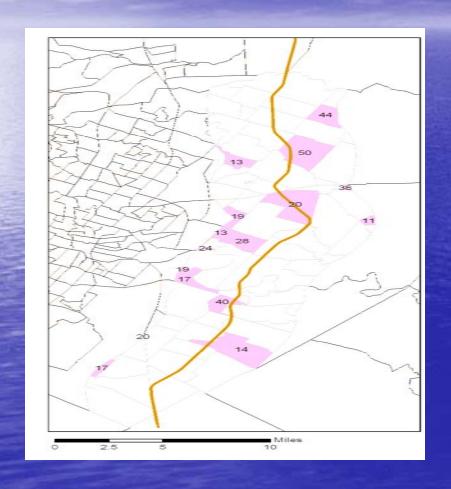
What is your EJ analysis study area for the proposed tolling program?

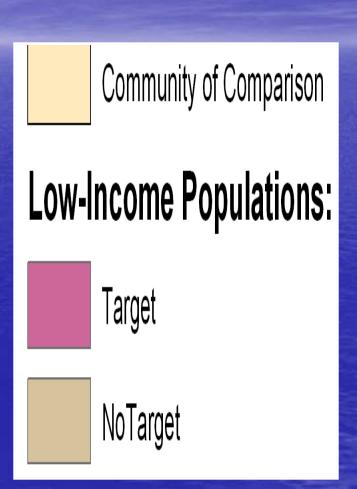
- Professional judgment (Expert Panel)
- Quantitative transportation modeling output (e.g. percent contribution of trips by TAZ)
- Combination of both methods
- How have locally affected communities been defined?
- What demographic methodology has been used? Is it justifiable?

Remember: Under NEPA/EJ/Title VI, communities can be their own baseline. The question in that case is whether the burdens to this community outweigh the benefits to the community

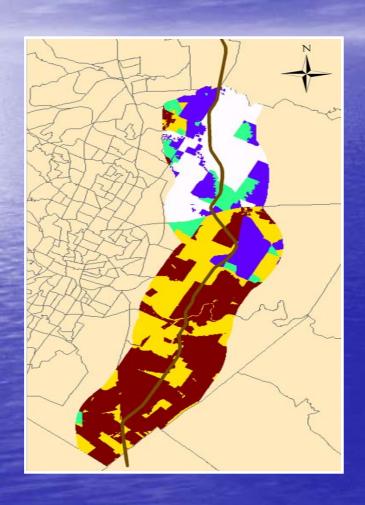
Spatial Distribution of Low-Income Populations

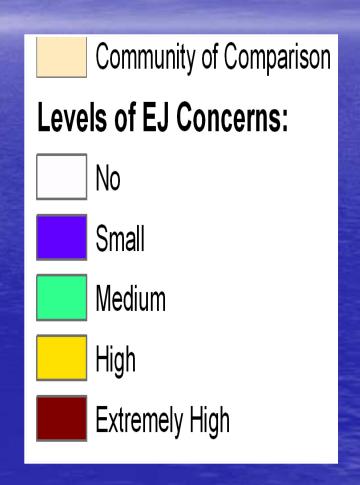
Based on Traffic Analysis Zones (TAZs)





Spatial Distribution of Minority Populations Based on Levels of EJ Concerns





What is the EJ demographic profile of the study area?

- Determine percentage of total study area population that is lowincome
- EJ minority
- Develop EJ demographic profile of the study area at a level of detail appropriate for analysis and to guide the public involvement program (e.g. TAZ, census block group, etc.)
- Identify sections of the study area with high concentrations of lowincome and/or EJ minority residents using accepted thresholds (e.g. TAZ percentage exceeds percentage of EJ residents in the study area, city, county, or state)

What do the economic, transportation and community profiles of potentially affected EJ populations reveal about their existing and future use of the transportation system?

- Transportation Service Characteristics
 - Vehicle ownership rates
 - Service availability of alternative modes
 - Existing commuting habits
 - Future commuting trends and needs
 - Trip contribution by mode to corridors/routes affected by proposed tolling program

What attributes are typically included in the "Commuting Habits" profile?

- Commuting Habits Profile by mode (e.g. vehicle, transit, pedestrian demand / dependency)
 - Commute to Work
 - Commute to Shop
 - Commute to Worship
 - Commute to School
 - Commute to Access Social Support Structure and Services
 - Average number of trips per mode
 - Travel direction by mode

How will tolling affect the EJ population's use of the transportation system (direct effects)?

Analyze transportation corridors to be tolled

- Assess percentage change in EJ trip contributions for untolled vs. tolled scenarios (e.g., evaluate TAZ's that exceed EJ thresholds and their trip contributions)
- Assess if/how EJ trips are diverted and redistributed within the network for the tolled scenario (e.g., alternative routes and modes)
- Compare non-EJ and EJ trip diversion trends; assess distinguishing differences
- Assess potential changes in transportation service efficiencies (e.g., alternative route LOS), commuting habits, and related costs and impacts experienced by EJ populations for the tolled scenario

How is the determination of "disproportionately high and adverse human health and environmental effects" reached?

After considering the adverse effects of the program/project on affected EJ populations, along with offsetting benefits and any committed mitigation/enhancements, the following parameters are typically assessed:

- Will adverse effects be predominately borne by an EJ population?
- Will the program limit or influence the availability of goods, services, or limit access to any EJ populations?
- Will the transportation system serving EJ areas and associated businesses and community resources be adversely affected?
- Will EJ populations be denied the benefits or have reduced benefits of the program?

What if the program or project has disproportionately high and adverse effects?

- Continue to work collaboratively with agency partners and community leaders to develop reasonable mitigation, if possible
- Assess if there is a substantial need for the program based on overall public interests
- Refer to US DOT and FHWA orders for further procedural details
- Finally, document, document, document accordingly...

Current Research

- ENV is currently managing a research team that is tasked with developing a methodology to assess potential EJ impacts of toll roads
- The Team includes the Author of Executive Order 12898 on Environmental Justice
- Completion date is August, 2005

